

CLAIMS:

1. A single-use package with a contact lens therein, wherein the package has an internal depth which is less than an overall sagittal depth of the contact lens when the contact lens is in its equilibrated state.
2. The package of claim 1 wherein the package comprises two sheets of material sealed together.
3. The package of claim 2 wherein the sheets are sealed around an entire perimeter of the package.
4. The package of claim 2 wherein the sheets are sealed in an area surrounding the contact lens.
5. The package of claim 2 wherein in addition to the seal surrounding the contact lens there is a seal around a perimeter of the package, wherein the seal is stronger around the contact lens than around a perimeter of the package.
6. The package of claim 2 wherein the sheets are unsealed at at least one corner of the package.
7. The package of claim 6 wherein the unsealed corner is an easy-open corner.
8. The package of claim 2 wherein the sheets are each multi-layer laminates.
9. The package of claim 2 wherein the sheets comprise polyolefin.
10. The package of claim 2 wherein one sheet is a multi-layer laminate and the other the sheet is polyolefin.

11. The package of claim 10 wherein the multi-layer laminate comprises one or more materials selected from the group consisting of polyethylene terephthalate, polypropylene and aluminum.
12. The package of claim 1 wherein the package has a first space containing a hydration medium.
13. The package of claim 2 wherein each of the two sheets is flat.
14. The package of claim 12 wherein the package has a second space also containing a hydration medium.
15. The package of claim 14 wherein the lens in the first space and the hydration medium in the second space are separated by a seam between two sheets of material.
16. The package of claim 14 wherein the second space containing the hydration medium may be opened at a time selected from the group consisting of before, after and during removal of the lens.
17. The package of claim 14 wherein a shape of the second space is selected from the group of flat and bulbous.
18. The package of claim 14 wherein the second space for hydration medium is connected to the first space.
19. The package of claim 14 wherein the second space for hydration medium may be snapped off from the first space.
20. The package of claim 18 wherein the connection is flexible.
21. The package of claim 14 wherein the second space for hydration medium has a cap.

22. The package of claim 21 wherein the cap is removable by one or more of twisting, snapping and pulling off.
23. The package of claim 2 wherein the sheets pull apart to release the lens.
24. The package of claim 2 wherein the two sheets are separated by a support member.
25. The package of claim 24 wherein the support member is selected from the group consisting of rigid and flexible.
26. The package of claim 25 wherein the support member surrounds the lens.
27. The package of claim 26 wherein the support member includes a netting.
28. The package of claim 27 wherein the netting supports the lens.
29. The package of claim 28 wherein the netting is made of a polyolefin material.
30. The package of claim 18 wherein the connection is perforated.
31. The package of claim 2 wherein at least one of the sheets is transparent.
32. The package of claim 2 wherein at least one surface of at least one of the sheets is colored.
33. The package of claim 32 wherein the color is displayed inwardly toward the contact lens when the package is in a sealed state so that the contact lens may be easily visualized when the package is opened.
34. The package of claim 33 wherein the color is selected from the group consisting of white, light blue and light green.

35. The package of claim 2 wherein at least one of the sheets displays symbols and the symbols are displayed inwardly toward the contact lens when the package is in a sealed state so that the symbols may be visualized when the package is opened.
36. The package of claim 35 wherein the symbols are selected from the group consisting of text, diagrams, and drawings.
37. The package of claim 19 wherein the second space for hydration medium serves as a handle for the package.
38. The package of claim 2 wherein at least one of the sheets is embossed.
39. The package of claim 38 wherein at least one of the sheets is embossed with one or more patterns selected from an abstract pattern, a grid and a logo.
40. The package of claim 1 wherein the contact lens has a total sagittal depth of between about 3.8 and about 5.0 mm and the package internal depth is less than about 3.0 mm.
41. The package of claim 1 wherein the package has a shape selected from the group consisting of a square, round, oval, tear drop, figure-eight, rectangle, and asymmetrical, symmetrical and rounded variations and combinations thereof.
42. The package of claim 1 wherein the contact lens is confined in the package such that it is always maintained in the same orientation while inside the package.

43. The package of claim 42 wherein the contact lens is in a flattened position.
44. The package of claim 2 wherein at least one of the two sheets is indented.
45. The package of claim 44 wherein one of the two sheets has a convex indentation.
46. The package of claim 45 wherein the convex indentation is aligned with a posterior surface of the lens.
47. The package of claim 44 wherein one of the two sheets has a convex indentation and one of the sheets has a concave indentation.
48. The package of claim 1 wherein the internal package configuration causes the lens to always be positioned so as to be ready for insertion when the package is opened.
49. The package of claim 48 wherein the lens may be pinched off the package and inserted into an eye.
50. The package of claim 1 wherein a cover is removed from a base to open the package.
51. The package of claim 50 wherein the cover is selected from the group consisting of aluminum foil, polypropylene, and combinations thereof.
52. The package of claim 50 wherein the cover is removable by a step selected from the group consisting of peeling, tearing, and lifting from the package.

53. The package of claim 52 wherein the cover may be removed by being lifted up from the base of the package.
54. The package of claim 50 further comprising a break-open edge.
55. The package of claim 54 wherein the break-open edge is connected to the cover.
56. The package of claim 55 wherein the break-open edge may be broken off of the base.
57. The package of claim 56 wherein the cover is able to be removed from the base when the break-open edge has been broken off of the base.
58. The package of claim 50 wherein the base is selected from the group consisting of flat and molded.
59. The package of claim 50 wherein the cover has a handle.
60. The package of claim 1 wherein the package further comprises a spring disc.
61. The package of claim 60 wherein the spring disc is arched in its equilibrated state.
62. The package of claim 60 wherein the spring disc is held flat within the package while the package is sealed.
63. The package of claim 62 wherein the spring disc returns to its equilibrated arched state when the package is opened.
64. The package of claim 60 wherein the spring disc comprises one or more materials selected from the group consisting of polyolefins, silicones, and combinations thereof.

65. The package of claim 60 wherein the spring disc is comprised of projections extending from a circular base.
66. The package of claim 60 wherein the contact lens rests upon the spring disc within the package.
67. The package of claim 1 further comprising a protuberance upon which the contact lens rests within the package.
68. The package of claim 67 wherein the protuberance is an inflexible mound.
69. The package of claim 68 wherein the contact lens is held immobilized between the protuberance and a cover sheet.
70. The package of claim 1 further comprising a textured surface on at least one side of the package.
71. The package of claim 70 wherein the textured surface is on both sides of the package.
72. The package of claim 70 wherein the textured surface is on a handle.
73. The package of claim 70 wherein the textured surface is selected from the group consisting of raised bumps and ridges.
74. The package of claim 1 comprising polypropylene.
75. The package of claim 1 comprising polypropylene and foil.
76. The package of claim 1 wherein the package is selected from the group consisting of a sachet type package and a blister package.
77. The package of claim 1 wherein the package has a total thickness of between 1.0 mm and 3.00 mm.

- 78. The package of claim 1 wherein the package comprises a tear notch.
- 79. The package of claim 1 wherein the package comprises a tear tab.
- 80. The package of claim 50 wherein the base comprises a pointed edge.
- 81. The package of claim 80 wherein the pointed edge aids removal of the cover.
- 82. The package of claim 81 wherein edges of the base may be bent to gain access to the contact lens.
- 83. A blister package comprising a molded base, a cover and a contact lens therein, wherein the internal depth of the blister package is less than the natural sagittal depth of the contact lens therein.
- 84. A contact lens package holder sheet, upon which one or more contact lens packages are affixed.
- 85. The holder sheet of claim 84 wherein the holder sheet is the size of a business card.
- 86. The holder sheet of claim 84 wherein there are two contact lens packages affixed thereto.
- 87. The holder sheet of claim 86 wherein the two contact lens package comprise two different prescriptions.
- 88. The holder sheet of claim 86 wherein the two contact lens packages comprise the same prescription.
- 86. The holder sheet of claim 85 wherein the packages are affixed to the holder sheet by one or more forms selected from the group consisting of adhesive, clips, and insertion slots.

87. The holder sheet of claim 84 wherein two or more packages are attached to the holder sheet.

88. The holder sheet of claim 84 wherein six or more packages are attached to the holder sheet.

89. A method of removing a contact lens from a contact lens package comprising the steps of:

- a) placing a package comprising a spring disc and a contact lens on a finger;
- b) pushing the finger through a center of the spring disc such that the contact lens thereon rests on the tip of the finger;
- c) placing the contact lens that rests on the finger into an eye.

90. A combination of the package of claim 1 and at least one additional package, each of the packages in the combination being identical and being connected to each other.

91. The combination of claim 90 wherein the connection is frangible

92. The combination of claim 90 wherein the combination includes between 3 and 6 packages

93. The combination of claim 90 wherein combination includes between 2 and 90 packages.

94. The combination of claim 90 wherein the connected packages form a strip of packages.

95. The combination of claim 94 wherein the strip is rolled up.

96. The combination of claim 94 wherein the packages have a first space for a contact lens and a second space for a hydration medium.

97. The combination of claim 94 wherein the strip is folded in a zigzag fashion.

98. A combination of a single-use contact lens package and a card onto which the single-use contact lens packages are removably adhered.

99. The combination of claim 98 wherein the single-use contact lens packages comprise a single prescription.

100. The combination of claim 98 wherein a plurality of single-use contact lens packages are removably adhered.

101. A single use package for retaining a contact lens, the package comprising at least one barrier material defining an internal space for holding a contact lens; a medium in the space for maintaining lens hydration; means to enable release of the lens from said space; wherein the at least one barrier layer is formed from a homogenous, pliable material.

102. A single-use package capable of holding a contact lens therein comprising:

a) two sheets of material; and

b) a support member between the two sheets of material;

wherein the two sheets of material are sealed and wherein the lens is confined in the package such that is always maintained in the same orientation inside the package.

103. The package of claim 102 wherein the support member is flexible.
104. The package of claim 102 wherein the support member is rigid.
105. The package of claim 102 wherein the support member surrounds the lens.
106. The package of claim 102 wherein the support member comprises a netting.
107. The package of claim 106 wherein the netting supports the lens.
108. The package of claim 107 wherein the netting is made of a material selected from the group consisting of polyolefins, silicones, and combinations thereof.
109. A carton containing at least 90 single-use packages each with a contact lens therein, wherein each of the packages has an internal depth which is less than an overall sagittal depth of each the contact lens within the package.
110. The carton of claim 109 wherein the carton contains about 180 of said packages.
111. A single-use package with a contact lens therein, wherein the package is configured such that when the package is opened, the lens is always oriented in the same position as when it was placed into the package.
112. The package of claim 111 wherein the lens is oriented with a concave side facing a cover that may be removed to open the package.

113. The package of claim 111 wherein the lens is oriented with convex side facing a cover that may be removed to open the package.
114. The package of claim 111 wherein the lens is oriented to be grasped between two fingers for insertion into an eye when the package is opened.
115. The package of claim 113 wherein the lens is oriented such that it may be pinched off from the package and inserted into the eye.
116. The package of claim 111 wherein the package has an internal depth less than the sagittal depth of the contact lens therein.
117. The package of claim 116 wherein a space for the lens within the package is restricted and prevents the lens from changing position within the space.
118. A contact lens package container having a plurality of contact lenses therein, wherein the contact lens packages are dispensed such that as one contact lens package is removed, a next contact lens package to be dispensed is automatically moved into a position to be removed.
119. The container of claim 118 wherein the packages therein are individual packages and are dispensed one at a time.
120. The container of claim 118 wherein the packages therein are connected to one another by a frangible connection.
121. A single-use package with a contact lens therein, wherein the package has an internal depth that is less than an overall sagittal depth of the contact lens in its equilibrated form, wherein the package comprises:

a) two sheets of material sealed together, wherein at least one of the sheets has printing thereon; and

b) at least one corner that is not sealed so as to serve as an easy-open corner;

wherein the contact lens therein is held in an at least partially flattened state while the package is sealed and returns to its natural state when the package is opened; and

wherein the printing is selected from the group consisting of instructions for use and prescription information; and

wherein at least one of the sheets of material is embossed to prevent the lens from sticking to the sheet, thus ensuring that the lens is presented in a predictable orientation when the package is opened.

122. A single-use package with a contact lens therein, comprising:

a) two sheets of material sealed together;

b) a spring disc between the sheets; and

c) a hydration medium;

wherein the lens is maintained in a flattened state while the package is sealed.

123. The package of claim 122 further comprising a first space for a contact lens and a second space for at least a portion of the hydration medium.

124. The package of claim 122 wherein the spring disc is flexible.

125. The package of claim 122 wherein the spring disc is compressible.
126. The package of claim 122 wherein the spring disc comprises polypropylene.
127. The package of claim 125 wherein the lens on the spring disc pops up when the package is opened.
128. The package of claim 122 wherein the package has an internal depth that is less than a natural sagittal depth of the contact lens therein.
129. A method of dispensing a single-use contact lens package from a group of packages, the method comprising:
- a) providing a dispensing container having a plurality of contact lens packages therein;
 - b) removing at least one contact lens package from the dispenser.
130. The method of claim 129 wherein the contact lens package pops-up from a removal area of the dispenser.
131. The method of claim 129 wherein the dispenser is a cylindrically shaped tube having one end for dispensing a contact lens package for a left eye and a second end for dispensing a contact lens package for a right eye.
132. A method for opening a single-use contact lens package having an internal depth that is less than the overall sagittal depth of an equilibrated contact lens therein, the method comprising separating a first barrier layer from a second barrier layer.

133. The method of claim 132 wherein the first barrier layer comprises a cover and the second barrier layer comprises a base.

134. The method of claim 133 wherein the first barrier layer comprises a first sheet of material and the second barrier layer comprises a second sheet of material.

135. A single-use package capable of holding a contact lens therein, the package comprising:

- a) at least one barrier layer of pliable packaging material forming at least first and second opposing surfaces which define an internal package space in which the contact lens is retained;
- b) a hydration medium in the space; and
- c) means for enabling release of the contact lens from the package; wherein the at least one barrier layer of material is flat and is flexible.

136. The package according to claim 135 wherein the package material is capable of deformation in response to a load applied to the package.

137. The package according to claim 135 wherein the fluid provides a buffer to dissipate energy generated by external loads applied to the package.

138. The package according to claim 135 wherein the package material comprises a single layer of the material that is folded back on itself and opposing edges of the material are heat sealed.

139. The package according to claim 135 wherein the package material comprises two single layers sheets of different materials.
140. The package according to claim 135 wherein the package material comprises two single layer sheets of identical material.
141. The package according to claim 135 wherein the package comprises a single sheet of multi-layer material that is folded back on itself and opposing edges of the material are heat sealed.
142. The package material according to claim 135 wherein the package comprises two sheets of identical multi-layer material.
143. The package according to claim 135 wherein the package comprises two sheets of different multi-layer material.
144. The package according to claim 135 wherein the means for enabling release of the contact lens from the package comprises a designated area on the package where the package may be opened by a method selected from the group consisting of peeling and tearing.
145. The package according to claim 144 wherein the means for enabling release comprises one or more areas along a perimeter of the package wherein the at least one barrier layer is only lightly heat sealed.
146. The package according to claim 144 wherein opposing edges of the opposing surfaces are heat sealed.
147. The package according to claim 135 wherein the lens in the space is free to move inside the space defined by the opposing inner surfaces and edges of the space.

148. The package according to claim 135 wherein a first opposing surface opposes an anterior surface of the contact lens and second opposing surface opposes a posterior surface of the contact lens.

149. The package according to 135 wherein, the at least one barrier layer comprises a multi-layer material wherein the multi-layer material comprises a metallic layer.

150. The package according to claim 149 wherein the multi-layer material further comprises an outer layer capable of displaying product indicia.

151. The package according to claim 150 wherein the multi-layer material comprises a polyolefin layer.

152. The package according to claim 151 wherein the outer layer engages an outer surface of a layer of aluminum.

153. The package according to claim 152 wherein the polyolefin layer comprises a polypropylene layer which engages an inner surface of the aluminum layer.

154. The package according to claim 135 having connected thereto at least one other identical package such that a set of at least two identical packages are formed.

155. The package according to claim 154 wherein each package is connected to an adjacent package via a frangible connection.

156. The package according to claim 135 comprising an additional package connected to the contact lens package and having therein a source of lens hydration medium.

157. The package according to claim 136 wherein the package material is pliable, allowing the package to withstand forces selected from the group consisting of deforming, flattening, twisting, bending, folding, crushing, and rolling in unison with the lens and without compromise to integrity of the lens.

158. A set of retort-type single-use packages for holding contact lenses therein, the packages each comprising:

- a) at least one layer of pliable package material forming at least first and second opposing surfaces which define an internal package space in which the contact lens is retained;
- b) a medium in the space for maintaining lens hydration; and
- c) means for enabling release of the contact lens from the package;

wherein the package material is capable of assuming a generally planar configuration; and

wherein the set is formed by jointing at least two of the packages end to end so that a single package may be torn away from an adjacent package via a frangible connection between the packages.

159. A retort-type single-use package comprising an internal space for holding a contact lens and a medium for maintaining lens hydration therein.

160. The package according to claim 159 wherein the pliability of the retort-type package enables the package to withstand force selected from the group consisting of rolling, folding, bending, twisting and flattening in unison with the lens without damage to the lens.

161. A secondary package for a plurality of contact lens packages comprising a container, wherein the contact lens packages contained therein have an internal depth that is less than the natural sagittal depth of the contact lens therein; and wherein the container is a shape selected from the group consisting of a circle, rectangle, square, triangle, oval and symmetrical, asymmetrical and rounded variations thereof.

162. The secondary package of claim 161 wherein the contact lens packages therein are in a configuration selected from the group consisting of a circle, rectangle, square, triangle, oval, parallel rows, and combinations thereof.

163. The secondary package of claim 162 wherein the contact lens packages are arranged in stacks.

164. The secondary package of claim 163 wherein the stacks comprise between 5 and 10 contact lens packages.

165. The secondary package of claim 163 wherein the stacks comprise between 10 and 30 contact lens packages.

166. The secondary package of claim 161 further comprising a contact lens package holder sheet upon which the contact lens packages are adhered.

167. The package of claim 166 wherein the package contains a plurality of the holder sheets.
168. The package of claim 161 wherein the secondary package contains a supply of contact lens packages selected from the group consisting of 30 days, 90 days and 180 days.
169. The secondary package of claim 161 further comprising a plurality of compartments for housing a plurality of stacks of contact lens packages.
170. The secondary package of claim 169 wherein the compartments are sealed and connected to one another by a cover.
171. The secondary package of claim 170 wherein the cover comprises vacuum formed PET.
172. A contact lens travel pack comprising a container with a lid and a base, a plurality of contact lenses packages and a handle.
173. The travel pack of claim 172 wherein the lid comprises a mirror.
174. The travel pack of claim 172 wherein the lid flips open.
175. The travel pack of claim 172 wherein the contact lenses are contained within the base in compartments.
176. The travel pack of claim 175 wherein the contact lenses are contained within the base with a sliding guide.
177. The travel pack of claim 172 wherein the contact lenses therein comprise individual packages.

178. The travel pack of claim 172 wherein the contact lenses therein comprise strips of connected contact lens packages folded in zigzag fashion.

179. A storage case for a plurality of contact lenses comprising a cover, a container for a plurality of contact lenses wherein the container comprises a lift-out insert.

180. The storage case of claim 179 wherein the contact lenses comprise a plurality of individual packages.

181. The storage case of claim 179 wherein the contact lenses comprise at least one strip of connected contact lens packages folded in zigzag fashion.

182. The storage case of claim 179 wherein the case initially contains a supply of contact lenses selected from the group consisting of 30, 90 and 180 days.

183. The storage case of claim 179 further comprising tabs spaced between the contact lenses.

184. The storage case of claim 183 wherein the tabs indicate the number of remaining contact lenses.

185. The storage case of claim 179 wherein the lift-out insert comprises a handle.

186. The storage case of claim 179 wherein a travel pack of contact lenses may be attached to the lid of the storage case.

187. A dispensing case for a plurality of contact lenses comprising a cylindrical container wherein each of the two ends of the container open to dispense the contact lenses.

188. The dispensing case of claim 187 wherein the contact lenses therein are held in an angle.

189. The dispensing case of claim 188 wherein the contact lenses slide out of the dispensing case.

190. The dispensing case of claim 189 wherein one end dispenses contact lenses for a left eye and the other end dispenses contact lenses for a right eye.

191. A storage stand for a plurality of contact lens packages comprising a base and a wall extending from the base, wherein the wall comprises a means for the lens packages to be attached thereto.

192. The storage stand of claim 191 wherein the lens packages snap onto the wall.

193. A storage means for a plurality of contact lenses comprising:

- a) a plurality of contact lens holder sheets with a narrow open slot;
- b) a plurality of contact lenses attached to the holder sheets;
- c) at least one container comprising a base with a narrow open

guide and lid with a narrow open slot; and

- d) a stand comprising a base and a central extension,

wherein the holder sheets are stored within the container and wherein the container slides onto the base.

194. A contact lens delivery package comprising an aluminum coated envelope, a plurality of contact lens packages, and nitrogen gas, wherein the envelope is filled with the nitrogen gas prior to sealing.

195. A single-use package for retaining a contact lens therein, the package comprising at least one package wall defining an internal space for holding the contact lens; a medium in the space for maintaining lens hydration; means to enable release of the lens from said space; wherein the at least one wall is formed from a pliable material.

196. A kit of jointed single use pliable retort-type single use packages for each holding a contact lens; wherein each single-use package is connected to at least one adjacent package.